<u>**Practical Interview**</u>
<u>**Full stack Developer (Java & Angular)**</u>
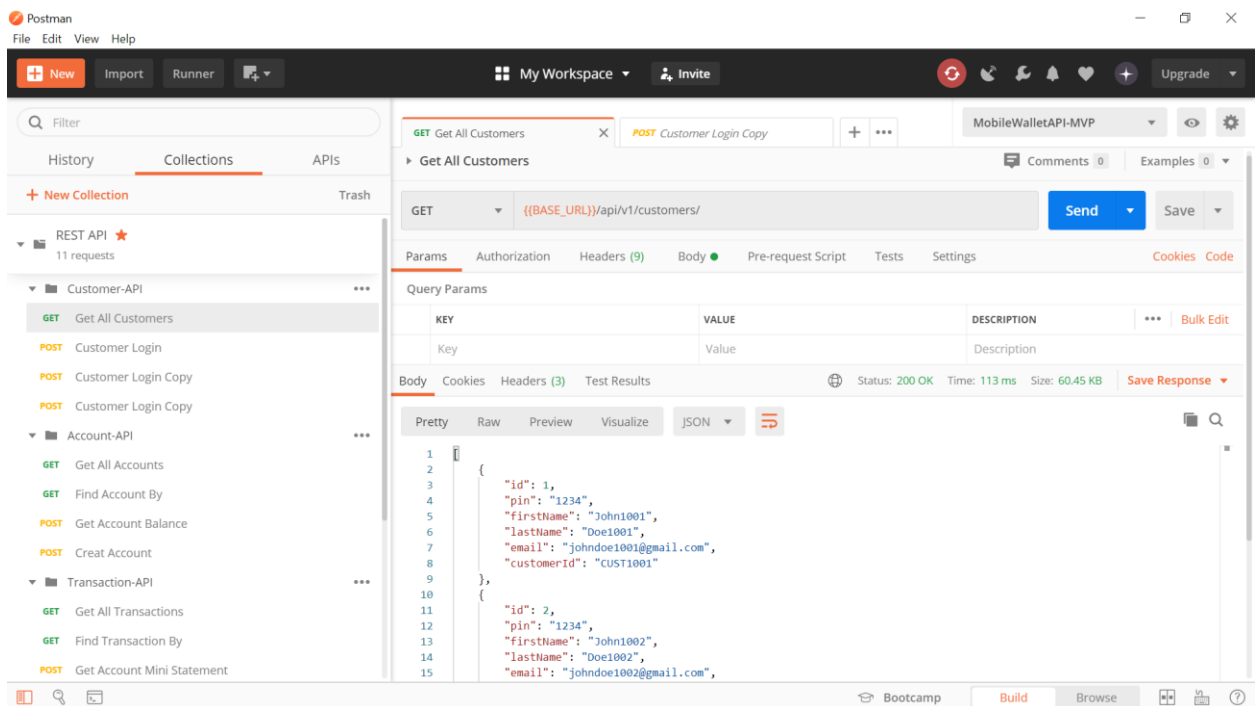
Instructions
You are expected to

1. **Develop a REST API using SpringBoot that provide below implementations (NB: Use H2 in memory database).**
   a) All Endpoints except login must be protected from unauthorized access. Use Spring security and JSON Web token (jwt). The token should be generated ONLY after successful login using Customer ID and PIN.
   b) Document your API using Swagger
   c) Log your API requests payload and response using logback. The logs path/file location MUST be as follows
      - Requests logs **"C:\var\log\applications\API\logs\request.log"**
      - Response logs **"C:\var\log\applications\API\logs\response.log"**
   d) Database tables
   [customer], [account], [transaction]
      1. Customer table - store customer data
      2. Account table - store account data
      3. Transaction table – store transaction data
   NB: Each transaction MUST have a unique Transaction ID

2. **Develop an Angular Web application to consume all the API endpoints (Angular >= 8 version).**

#	Task/Requirement	Description	
1	Customer registration – provide customer name, email and ID	Generate random customer PIN and customer account, Initialize customer account with zero balance	
2	Customer login	Login using customer ID and PIN, return JSON Token after successful login	
3	Get customer balance	Return customer balance	
4	Get customer mini-statement	Return a list of last 10 transactions for the customer	
5	Cash deposit X amount	Credit customer account with X amount, and return current balance	
6	Cash withdrawal Y amount	Debit customer account with Y amount, and return current balance	

7	Funds transfer from customer Account to Account B (Amount X)	Debit customer account with X amount, and Credit account B with X amount, and return current customer balance	
8	Search transaction by transaction ID	Return transaction details	

NB:
- Use Postman to test you REST API.
- Below screen shot is provided to give you a quick feel.
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Submission (All a MUST have):
- Export your postman collection and save it in your project
- Include README file with instructions on how to run your projects (Following your instructions a non-technical person should get the applications up and running)
- Host your projects in Github and share the links (NB: Host the API and Angular App as separate projects)

- **Record and share a short video demonstrating your work (max 5 minutes). Show/demonstrate how you run your projects and give a highlight of the implemented features.**

Scoring Weights

Task	Points/Marks	Candidate's Score
REST API	30	
Anguar Web App	30	
Submission/follow instructions	20	
Video	20	
Total Score	**100**	